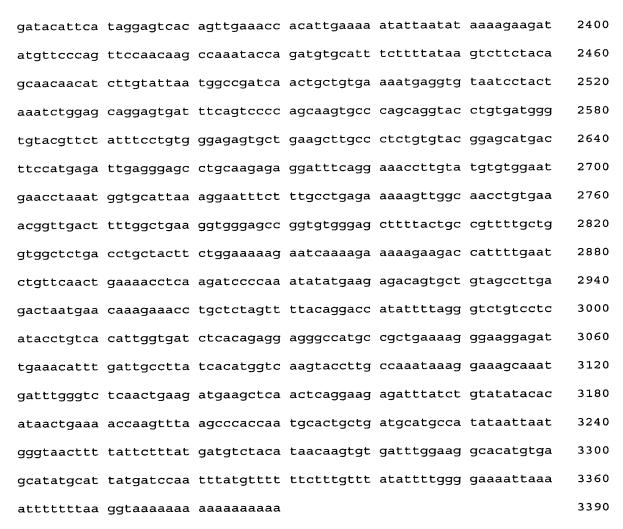
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Pro Ala Glu Ala Pro Arg Arg Gly Arg Ser Pro Pro Trp Ser Pro Ala 20 25 30

Trp Ile Cys Cys Trp Ala Leu Ala Gly Cys Gln Ala Ala Trp Ala Gly 35 40 45

Asp Leu Pro Ser Ser Ser Ser Arg Pro Leu Pro Pro Cys Gln Glu Lys 50 55 60

Asp Tyr His Phe Glu Tyr Thr Glu Cys Asp Ser Ser Gly Ser Arg Trp 65 70 75 80

Arg Val Ala Ile Pro Asn Ser Ala Val Asp Cys Ser Gly Leu Pro Asp 85 90 95

<sup>&</sup>lt;211> 963

<sup>&</sup>lt;212> PRT

<sup>&</sup>lt;213> human

<sup>&</sup>lt;400> 2

Pro Val Arg Gly Lys Glu Cys Thr Phe Ser Cys Ala Ser Gly Glu Tyr Leu Glu Met Lys Asn Gln Val Cys Ser Lys Cys Gly Glu Gly Thr Tyr 120 Ser Leu Gly Ser Gly Ile Lys Phe Asp Glu Trp Asp Glu Leu Pro Ala 135 Gly Phe Ser Asn Ile Ala Thr Phe Met Asp Thr Val Val Gly Pro Ser 155 Asp Ser Arg Pro Asp Gly Cys Asn Asn Ser Ser Trp Ile Pro Arg Gly 170 Asn Tyr Ile Glu Ser Asn Arg Asp Asp Cys Thr Val Ser Leu Ile Tyr 185 Ala Val His Leu Lys Lys Ser Gly Tyr Val Phe Phe Glu Tyr Gln Tyr Val Asp Asn Asn Ile Phe Phe Glu Phe Phe Ile Gln Asn Asp Gln Cys 210 Gln Glu Met Asp Thr Thr Thr Asp Lys Trp Val Lys Leu Thr Asp Asn 235 230 Gly Glu Trp Gly Ser His Ser Val Met Leu Lys Ser Gly Thr Asn Ile Leu Tyr Trp Arg Thr Thr Gly Ile Leu Met Gly Ser Lys Ala Val Lys Pro Val Leu Val Lys Asn Ile Thr Ile Glu Gly Val Ala Tyr Thr Ser Glu Cys Phe Pro Cys Lys Pro Gly Thr Phe Ser Asn Lys Pro Gly Ser 295 Phe Asn Cys Gln Val Cys Pro Arg Asn Thr Tyr Ser Glu Lys Gly Ala 305 Lys Glu Cys Ile Arg Cys Lys Asp Asp Ser Gln Phe Ser Gly Ser Ser Glu Cys Thr Glu Arg Pro Pro Cys Thr Thr Lys Asp Tyr Phe Gln Ile His Thr Pro Cys Asp Glu Glu Gly Lys Thr Gln Ile Met Tyr Lys Trp 360 Ile Glu Pro Lys Ile Cys Arg Glu Asp Leu Thr Asp Ala Ile Arg Leu 370 Pro Pro Ser Gly Glu Lys Lys Asp Cys Pro Pro Cys Asn Pro Gly Phe 395

410

Tyr Asn Asn Gly Ser Ser Ser Cys His Pro Cys Pro Pro Gly Thr Phe

405

Ser Asp Gly Thr Lys Glu Cys Arg Pro Cys Pro Ala Gly Thr Glu Pro 420 425 430

Ala Leu Gly Phe Glu Tyr Lys Trp Trp Asn Val Leu Pro Gly Asn Met 435 440 445

Lys Thr Ser Cys Phe Asn Val Gly Asn Ser Lys Cys Asp Gly Met Asn 450 455 460

Gly Trp Glu Val Ala Gly Asp His Ile Gln Ser Gly Ala Gly Gly Ser 465 470 475 480

Asp Asn Asp Tyr Leu Ile Leu Asn Leu His Ile Pro Gly Phe Lys Pro 485 490 495

Pro Thr Ser Met Thr Gly Ala Thr Gly Ser Glu Leu Gly Arg Ile Thr 500 505 510

Phe Val Phe Glu Thr Leu Cys Ser Ala Asp Cys Val Leu Tyr Phe Met 515 520 525

Val Asp Ile Asn Arg Lys Ser Thr Asn Val Val Glu Ser Trp Gly Gly 530 535 540

Thr Lys Glu Lys Gln Ala Tyr Thr His Ile Ile Phe Lys Asn Ala Thr 545 550 555 560

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Arg Arg Phe Ile Asn Asp Met Val Lys Ile Tyr Ser Ile Thr Ala Thr 580 585 590

Asn Ala Val Asp Gly Val Ala Ser Ser Cys Arg Ala Cys Ala Leu Gly 595 600 605

Ser Glu Gln Ser Gly Ser Ser Cys Val Pro Cys Pro Pro Gly His Tyr 610 615 620

Ile Glu Lys Glu Thr Asn Gln Cys Lys Glu Cys Pro Pro Asp Thr Tyr 625 630 635 640

Leu Ser Ile His Gln Val Tyr Gly Lys Glu Ala Cys Ile Pro Cys Gly 645 650 655

Pro Gly Ser Lys Asn Asn Gln Asp His Ser Val Cys Tyr Ser Asp Cys 660 665 670

Phe Phe Tyr His Glu Lys Glu Asn Gln Ile Leu His Tyr Asp Phe Ser 675 680 685

Asn Leu Ser Ser Val Gly Ser Leu Met Asn Gly Pro Ser Phe Thr Ser 690 695 700

Lys Gly Thr Lys Tyr Phe His Phe Phe Asn Ile Ser Leu Cys Gly His 705 710 715 720

Glu Gly Lys Lys Met Ala Leu Cys Thr Asn Asn Ile Thr Asp Phe Thr
725 730 735

Val Lys Glu Ile Val Ala Gly Ser Asp Asp Tyr Thr Asn Leu Val Gly

740 745 750

Ala Phe Val Cys Gln Ser Thr Ile Ile Pro Ser Glu Ser Lys Gly Phe 760 Arg Ala Ala Leu Ser Ser Gln Ser Ile Ile Leu Ala Asp Thr Phe Ile 775 Gly Val Thr Val Glu Thr Thr Leu Lys Asn Ile Asn Ile Lys Glu Asp 795 790 Met Phe Pro Val Pro Thr Ser Gln Ile Pro Asp Val His Phe Phe Tyr 810 805 Lys Ser Ser Thr Ala Thr Thr Ser Cys Ile Asn Gly Arg Ser Thr Ala 825 Val Lys Met Arg Cys Asn Pro Thr Lys Ser Gly Ala Gly Val Ile Ser 840 Val Pro Ser Lys Cys Pro Ala Gly Thr Cys Asp Gly Cys Thr Phe Tyr 855 Phe Leu Trp Glu Ser Ala Glu Ala Cys Pro Leu Cys Thr Glu His Asp 875 Phe His Glu Ile Glu Gly Ala Cys Lys Arg Gly Phe Gln Glu Thr Leu Tyr Val Trp Asn Glu Pro Lys Trp Cys Ile Lys Gly Ile Ser Leu Pro Glu Lys Lys Leu Ala Thr Cys Glu Thr Val Asp Phe Trp Leu Lys Val Gly Ala Gly Val Gly Ala Phe Thr Ala Val Leu Leu Val Ala Leu Thr 935 Cys Tyr Phe Trp Lys Lys Asn Gln Lys Lys Lys Lys Thr Ile Leu Asn

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960

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Met Leu Phe Arg Ala Arg Gly Pro Val Arg Gly Arg Gly Trp Gly Arg 1 5 10 15

Pro Ala Glu Ala Pro Arg Arg Gly Arg Ser Pro Pro Trp Ser Pro Ala 20 25 30

<sup>&</sup>lt;210> 4

<sup>&</sup>lt;211> 1027

<sup>&</sup>lt;212> PRT

<sup>&</sup>lt;213> human

<sup>&</sup>lt;400> 4

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- Asp Leu Pro Ser Ser Ser Ser Arg Pro Leu Pro Pro Cys Gln Glu Lys 50 55 60
- Asp Tyr His Phe Glu Tyr Thr Glu Cys Asp Ser Ser Gly Ser Arg Trp 65 70 75 80
- Arg Val Ala Ile Pro Asn Ser Ala Val Asp Cys Ser Gly Leu Pro Asp 85 90 95
- Pro Val Arg Gly Lys Glu Cys Thr Phe Ser Cys Ala Ser Gly Glu Tyr 100 105 110
- Leu Glu Met Lys Asn Gln Val Cys Ser Lys Cys Gly Glu Gly Thr Tyr 115 120 125
- Ser Leu Gly Ser Gly Ile Lys Phe Asp Glu Trp Asp Glu Leu Pro Ala 130 135 140
- Gly Phe Ser Asn Ile Ala Thr Phe Met Asp Thr Val Val Gly Pro Ser 145 150 155 160
- Asp Ser Arg Pro Asp Gly Cys Asn Asn Ser Ser Trp Ile Pro Arg Gly 165 170 175
- Asn Tyr Ile Glu Ser Asn Arg Asp Asp Cys Thr Val Ser Leu Ile Tyr 180 185 190
- Ala Val His Leu Lys Lys Ser Gly Tyr Val Phe Phe Glu Tyr Gln Tyr 195 200 205
- Val Asp Asn Asn Ile Phe Phe Glu Phe Phe Ile Gln Asn Asp Gln Cys 210 215 220
- Gln Glu Met Asp Thr Thr Thr Asp Lys Trp Val Lys Leu Thr Asp Asn 225 230 235 240
- Gly Glu Trp Gly Ser His Ser Val Met Leu Lys Ser Gly Thr Asn Ile 245 250 255
- Leu Tyr Trp Arg Thr Thr Gly Ile Leu Met Gly Ser Lys Ala Val Lys 260 265 270
- Pro Val Leu Val Lys Asn Ile Thr Ile Glu Gly Val Ala Tyr Thr Ser 275 280 285
- Glu Cys Phe Pro Cys Lys Pro Gly Thr Phe Ser Asn Lys Pro Gly Ser 290 295 300
- Phe Asn Cys Gln Val Cys Pro Arg Asn Thr Tyr Ser Glu Lys Gly Ala 305 310 315 320
- Lys Glu Cys Ile Arg Cys Lys Asp Asp Ser Gln Phe Ser Gly Ser Ser
- Glu Cys Thr Glu Arg Pro Pro Cys Thr Thr Lys Asp Tyr Phe Gln Ile 340 345 350
- His Thr Pro Cys Asp Glu Glu Gly Lys Thr Gln Ile Met Tyr Lys Trp

355 360 365

Ile	Glu 370	Pro	Lys	Ile	Cys	Arg 375	Glu	Asp	Leu	Thr	Asp 380	Ala	Ile	Arg	Leu
Pro 385	Pro	Ser	Gly	Glu	Lys 390	Lys	Asp	Cys	Pro	Pro 395	Cys	Asn	Pro	Gly	Phe 400
Tyr	Asn	Asn	Gly	Ser 405	Ser	Ser	Cys	His	Pro 410	Cys	Pro	Pro	Gly	Thr 415	Phe
Ser	Asp	Gly	Thr 420	Lys	Glu	Cys	Arg	Pro 425	Cys	Pro	Ala	Gly	Thr 430	Glu	Pro
Ala	Leu	Gly 435	Phe	Glu	Tyr	Lys	Trp 440	Trp	Asn	Val	Leu	Pro 445	Gly	Asn	Met
Lys	Thr 450	Ser	Cys	Phe	Asn	Val 455	Gly	Asn	Ser	Lys	Cys 460	Asp	Gly	Met	Asn
Gly 465	Trp	Glu	Val	Ala	Gly 470	Asp	His	Ile	Gln	Ser 475	Gly	Ala	Gly	Gly	Ser 480
Asp	Asn	Asp	Tyr	Leu 485	Ile	Leu	Asn	Leu	His 490	Ile	Pro	Gly	Phe	Lys 495	Pro
Pro	Thr	Ser	Met 500	Thr	Gly	Ala	Thr	Gly 505	Ser	Glu	Leu	Gly	Arg 510	Ile	Thr
Phe	Val	Phe 515	Glu	Thr	Leu	Cys	Ser 520	Ala	Asp	Cys	Val	Leu 525	Tyr	Phe	Met
Val	Asp 530	Ile	Asn	Arg	Lys	Sér 535	Thr	Asn	Val	Val	Glu 540	Ser	Trp	Gly	Gly
Thr 545	Lys	Glu	Lys	Gln	Ala 550	Tyr	Thr	His	Ile	Ile 555	Phe	Lys	Asn	Ala	Thr 560
Phe	Thr	Phe	Thr	Trp 565	Ala	Phe	Gln	Arg	Thr 570	Asn	Gln	Gly	Gln	Asp 575	Asn
Arg	Arg	Phe	Ile 580	Asn	Asp	Met	Val	Lys 585	Ile	Tyr	Ser	Ile	Thr 590	Ala	Thr
Asn	Ala	Val 595	Asp	Gly	Val	Ala	Ser 600	Ser	Cys	Arg	Ala	Cys 605	Ala	Leu	Gly
Ser	Glu 610	Gln	Ser	Gly	Ser	Ser 615	Cys	Val	Pro	Cys	Pro 620	Pro	Gly	His	Tyr
Ile 625	Glu	Lys	Glu	Thr	Asn 630	Gln	Cys	Lys	Glu	Cys 635	Pro	Pro	Asp	Thr	Tyr 640
Leu	Ser	Ile	His	Gln 645	Val	Tyr	Gly	Lys	Glu 650	Ala	Cys	Ile	Pro	Cys 655	Gly
Pro	Gly	Ser	Lys 660	Asn	Asn	Gln	Asp	His 665	Ser	Val	Cys	Tyr	Ser 670	Asp	Cys
Phe	Phe	Tyr 675	His	Glu	Lys	Glu	Asn 680	Gln	Ile	Leu	His	Tyr 685	Asp	Phe	Ser

- Asn Leu Ser Ser Val Gly Ser Leu Met Asn Gly Pro Ser Phe Thr Ser 690 695 700
- Lys Gly Thr Lys Tyr Phe His Phe Phe Asn Ile Ser Leu Cys Gly His 705 710 715 720
- Glu Gly Lys Lys Met Ala Leu Cys Thr Asn Asn Ile Thr Asp Phe Thr
  725 730 735
- Val Lys Glu Ile Val Ala Gly Ser Asp Asp Tyr Thr Asn Leu Val Gly 740 745 750
- Ala Phe Val Cys Gln Ser Thr Ile Ile Pro Ser Glu Ser Lys Gly Phe
  755 760 765
- Arg Ala Ala Leu Ser Ser Gln Ser Ile Ile Leu Ala Asp Thr Phe Ile 770 780
- Gly Val Thr Val Glu Thr Thr Leu Lys Asn Ile Asn Ile Lys Glu Asp 785 790 795 800
- Met Phe Pro Val Pro Thr Ser Gln Ile Pro Asp Val His Phe Phe Tyr 805 810 815
- Lys Ser Ser Thr Ala Thr Thr Ser Cys Ile Asn Gly Arg Ser Thr Ala 820 825 830
- Val Lys Met Arg Cys Asn Pro Thr Lys Ser Gly Ala Gly Val Ile Ser 835 840 845
- Val Pro Ser Lys Cys Pro Ala Gly Thr Cys Asp Gly Cys Thr Phe Tyr 850 855 860
- Phe Leu Trp Glu Ser Ala Glu Ala Cys Pro Leu Cys Thr Glu His Asp 865 870 875 886
- Phe His Glu Ile Glu Gly Ala Cys Lys Arg Gly Phe Gln Glu Thr Leu 885 890 895
- Tyr Val Trp Asn Glu Pro Lys Trp Cys Ile Lys Gly Ile Ser Leu Pro 900 905 910
- Glu Lys Lys Leu Ala Thr Cys Glu Thr Val Asp Phe Trp Leu Lys Val 915 920 925
- Gly Ala Gly Val Gly Ala Phe Thr Ala Val Leu Leu Val Ala Leu Thr 930 935 940
- Cys Tyr Phe Trp Lys Lys Asn Gln Lys Leu Glu Tyr Lys Tyr Ser Lys 945 950 955 960
- Leu Val Met Thr Thr Asn Ser Lys Glu Cys Glu Leu Pro Ala Ala Asp 965 970 975
- Ser Cys Ala Ile Met Glu Gly Glu Asp Asn Glu Glu Glu Val Val Tyr 980 985 990
- Ser Asn Lys Gln Ser Leu Leu Gly Lys Leu Lys Ser Leu Ala Thr Lys 995 1000 1005

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Ser Pro Asn Ile 1025

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<213> human

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Thr Leu Ala Thr Ala Asp Ile Pro Thr Ser Ser Leu Pro His Ala Pro 20 25 30

Val Asn Gly Ala Cys Asp Glu Gly Glu Tyr Leu Asp Lys Arg His Asn 35 40 45

Gln Cys Cys Asn Gln Cys Pro Pro Gly Glu Phe Ala Lys Val Arg Cys 50 55 60

Asn Gly Asn Asp Asn Thr Lys Cys Glu Arg Cys Pro Pro His Thr Tyr 65 70 75 80

Thr Ala Ile Pro Asn Tyr Ser Asn Gly Cys His Gln Cys Arg Lys Cys 85 90 95

Pro Thr Gly Ser Phe Asp Lys Val Lys Cys Thr Gly Thr Gln Asn Ser 100 105 110

Lys Cys Ser Cys Leu Pro Gly Trp Tyr Cys Ala Thr Asp Ser Ser Gln
115 120 125

Thr Glu Asp Cys Arg Asp Cys Ile Pro Lys Arg Arg Cys Pro Cys Gly 130 135

Tyr Phe Gly Gly Ile Asp Glu Gln Gly Asn Pro Ile Cys Lys Ser Cys 145 150 155 160

Cys Val Gly Glu Tyr Cys Asp Tyr Leu Arg Asn Tyr Arg Leu Asp Pro 165 170 175

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Gly Asn Gly Met Val Ser Arg Cys Ser Arg Ser Gln Asn Thr Val Cys 50 55 60

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Cys Lys Pro Cys Thr Trp Cys Asn Leu Arg Ser Gly Ser Glu Arg Lys 85 90 95

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Thr Gln Pro Leu Asp Ser Tyr Lys Pro Gly Val Asp Cys Ala Pro Cys 115 120 125

Pro Pro Gly His Phe Ser Pro Gly Asp Asn Gln Ala Cys Lys Pro Trp 130 135 140

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Glu Ala Trp Pro Arg Thr Ser Gln Gly Pro Ser Thr Arg Pro Val Glu 195 200 205

Val Pro Gly Gly Arg Ala Val Ala Ala Ile Leu Gly Leu Gly Leu Val 210 215 220

Leu Gly Leu Leu Gly Pro Leu Ala Ile Leu Leu Ala Leu Tyr Leu Leu 225 230 235 240

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Leu	Leu 50	Gly	Lys	Leu	Lys	Ser 55	Leu	Ala	Thr	Lys	Glu 60	Lys	Glu	Asp	His		
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95

90

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.05 410 415

Val Asp Ile Asn Arg Lys Ser Thr Asn Val Val Glu Ser Trp Gly Gly 420 425 430

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